

## EAST Search History

Ref #	Hits	Search Query	DBs	Default Operator	Plurals	Time Stamp
L1	1	"4609773".pn.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 12:16
L2	4780	(semi\$circle sem\$circular) with seal\$4	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 12:16
L3	1195	(semi\$circle sem\$circular) near3 seal\$4	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 12:16
L4	20	((semi\$circle sem\$circular) near3 seal\$4) with layer\$3	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 12:21
L5	6318	valve same (seal\$4 with (layer\$3 overlap\$4))	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 12:24
L6	2264	valve same (seal\$4 near3 (layer\$3 overlap\$4))	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 13:17
L9	7	("5743884").URPN.	USPAT	OR	OFF	2007/03/01 12:29
L10	1	"5673841".pn.	USPAT	OR	OFF	2007/03/01 12:29
L11	3	("6595946").URPN.	USPAT	OR	OFF	2007/03/01 12:31
L12	2	("6610031").URPN.	USPAT	OR	OFF	2007/03/01 12:31
L13	17	("2023267"   "3872525"   "4673393"   "5000745"   "5009391"   "5030205"   "5041095"   "5053013"   "5057084"   "5092846"   "5104389"   "5389081"   "5409463"   "5507732"   "5743884"   "6086570").PN.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 12:33
L14	2	("6610031").URPN.	USPAT	OR	OFF	2007/03/01 12:37

## EAST Search History

L17	42	( "20020013552"   "20030004529"   "20040066008"   "5053016"   "5116353"   "5197955"   "5209737"   "5242412"   "5290245"   "5300036"   "5308336"   "5342315"   "5354280"   "5385553"   "5391153"   "5411483"   "5492304"   "5496280"   "5545142"   "5554124"   "5584850"   "5603702"   "5628732"   "5643301"   "5657963"   "5720759"   "5727770"   "5752938"   "5792113"   "5820600"   "5865812"   "5957888"   "6066117"   "6123689"   "6162196"   "6217555"   "6228061"   "6258065"   "6551282"   "6595946"   "6702787"   "6726663").PN.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 12:38
L18	30	( "5492304").URPN.	USPAT	OR	OFF	2007/03/01 12:46
L19	28	( "4705040"   "4890612"   "4929246"   "5108420"   "5254133"   "5330501"   "5342393"   "5350399"   "5391183"   "5492304"   "5512053"   "5540715"   "5613974"   "5634937"   "5810884"   "5861003"   "5893856"   "5957952"   "5964782"   "5984950"   "6007563"   "6197042").PN. OR ("6632237").URPN.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 12:51
L20	165	( "3853127"   "4000739"   "4143853"   "4177814"   "4244379"   "4412836"   "4430081"   "4436519"   "4475548"   "4610665"   "4610674"   "4626245").PN. OR ("4673393").URPN.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 12:58

## EAST Search History

L21	93	("0729423"   "2797837"   "3086797"   "3197173"   "3438607"   "3766916"   "3788318"   "3811440"   "3856010"   "3875938"   "3920215"   "3970089"   "3977400"   "3994287"   "4000739"   "4149535"   "4177814"   "4202527"   "4231400"   "4240411"   "4243034"   "4324239"   "4378013"   "4424833"   "4430081"   "4436519"   "4473369"   "4475548"   "4496348"   "4580573"   "4610665"   "4610674"   "4626245"   "4634421"   "4654030"   "4655752"   "4673393"   "4723550"   "4786028"   "4798594"   "4817631"   "4839471"   "4842591"   "4869717"   "4874377"   "4884091"   "4895565"   "4909798"   "4917668"   "4929235"   "4943280"   "4960259"   "4960412"   "4978341"   "5000745"   "5009391"   "5009643"   "5041095"   "5053014"   "5053016"   "5104383"   "5104389"   "5127626"   "5127909"   "5197955"   "5211370"   "5211633"   "5221264").PN. OR ("5389081"). URPN.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 13:11
L23	10804	valve and (seal\$4 near3 (circumferential\$2 circumference))	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 13:45
L24	12	franer-p\$.in.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 13:23
L25	565	thompson-b\$.in.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 13:23
L26	94	25 and seal\$3	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 13:23
L27	144	valve and (seal\$4 near3 (woven interwoven))	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:01

## EAST Search History

L28	59	("20020007153" "20020010425" "20040049173" "20040064100" "20040147949" "20040171990" "3504699" "3773233" "4436519" "4601710" "4610665" "4654030" "4902280" "4931042" "4932633" "5030206" "5053013" "5104383" "5203773" "5209737" "5211634" "5246425" "5300033" "5308336" "5324270" "5366445" "5385552" "5385553" "5441041" "5456284" "5467762" "5534009" "5542931" "5549565" "5569160" "5578016" "5584850" "5603702" "5643301" "5720730" "5725504" "5743884" "5800451" "5807338" "5895377" "6024729" "6080134" "6086603" "6093176" "6254529" "6270484" "6277100" "6302852" "6352520" "6569120" "6613063" "6685630" "6702787"). PN.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 13:56
L30	9893	valve and (seal\$4 near3 (overlap\$4 layer\$3))	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:05
L31	3578	((seal\$4 near3 (segment member)) near3 (overlap\$4 layer\$3))	US-PGPUB; USPAT; USOCR	OR	ON	2007/03/01 14:08
L32	424	30 and "604"/\$.ccls.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:13
L33	1518	((seal\$4 near3 (multiple plurality)) near3 (overlap\$4 layer\$3))	US-PGPUB; USPAT; USOCR	OR	ON	2007/03/01 14:09
L34	41	33 and "604"/\$.ccls.	US-PGPUB; USPAT; USOCR	OR	ON	2007/03/01 14:09
L35	413	30 and "251"/\$.ccls.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:14
L36	580	30 and "137"/\$.ccls.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:13
L37	19	33 and "137"/\$.ccls.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:14
L38	10	33 and "251"/\$.ccls.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:14

## EAST Search History

L39	103	( "0729423"   "2797837"   "3086797"   "3197173"   "3438607"   "3766916"   "3811440"   "3856010"   "3875938"   "3920215"   "3970089"   "3977400"   "3994287"   "4000739"   "4149535"   "4177814"   "4231400"   "4240411"   "4243034"   "4324239"   "4338933"   "4378013"   "4424833"   "4430081"   "4436519"   "4473369"   "4475548"   "4496348"   "4580573"   "4610665"   "4610674"   "4626245"   "4634421"   "4654030"   "4655752"   "4673393"   "4699356"   "4715360"   "4723550"   "4758225"   "4786028"   "4798594"   "4817631"   "4839471"   "4842591"   "4857062"   "4869717"   "4895346"   "4895565"   "4909798"   "4917668"   "4929235"   "4960259"   "4960412"   "4966588"   "4978341"   "5000745"   "5009391"   "5009643"   "5041095"   "5053014"   "5053016"   "5064416"   "5069424"   "5104383"   "5104389"   "5127626"   "5127909"   "5167636"   "5180373"   "5195980"   "5197955"   "5209737"   "5226891"   "5269771"   "5308336"   "5342315"   "5385553"   "5411483"   "5423848"   "5476475"   "5492304").PN. OR ("5657963").URPN.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:44
L40	48	( "3504699" "3773233" "4436519" "4601710" "4610665" "4654030" "4902280" "4931042" "4932633" "5030206" "5053013" "5104383" "5203773" "5209737" "5211634" "5246425" "5300033" "5308336" "5324270" "5342315" "5366445" "5385552" "5441041" "5456284" "5467762" "5534009" "5542931" "5569160" "5578016" "5584850" "5603702" "5643301" "5792113" "5807338" "5895377" "6017356" "6024729" "6086603" "6093176" "6254529" "6277100" "6302852" "6352520" "6569120" "6613063" "6685630" "6702787").pn.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:48

## EAST Search History

L41	10	("20020007153" "20020010425" "20030060770" "20030187397" "20040049173" "20040064100" "20040111060" "20040147949" "20040230161")	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 14:49
L42	51	("4723550"   "4842591").PN. OR ("5209737").URPN.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 15:08
L43	75	606/185 and @pd>"20060918"	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 16:24
L44	12	604/167.03 and @pd>"20060918"	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 16:24
L45	14	604/167.04 and @pd>"20060918"	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 16:24
L46	15	604/167.06 and @pd>"20060918"	US-PGPUB; USPAT; USOCR	OR	OFF	2007/03/01 16:24
S1	1	"20040230161"	US-PGPUB; USPAT; USOCR	OR	OFF	2007/02/28 21:08
S2	1	"6017356".pn.	US-PGPUB; USPAT; USOCR	OR	OFF	2006/03/29 15:10
S3	1	"5308336".pn.	US-PGPUB; USPAT; USOCR	OR	OFF	2006/03/29 15:12
S4	1	"5385553".pn.	US-PGPUB; USPAT; USOCR	OR	OFF	2006/03/29 15:12
S5	1	"5387197".pn.	USPAT	OR	OFF	2006/03/29 15:35
S6	11	("4535733" "4539976" "5314417" "5323765" "5350393" "5364372" "54 31635" "5571134" "5591190" "5607 440" "5609604").pn.	USPAT	OR	OFF	2006/03/29 15:37
S9	930510	seal gasket	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 16:47
S10	7	S6 and S9	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 16:47
S11	1939732	over\$lap layer\$3	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 16:49

## EAST Search History

S14	8723	trocar	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 16:52
S15	10595	(over\$lap layer\$3) near (seal gasket ring)	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 16:57
S16	24	S15 and S14	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 16:52
S17	99117	(over\$lap layer\$3) with (seal gasket ring)	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/30 15:38
S18	351	S14 and S17	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 17:26
S19	21	(mark and zeiner).in.	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 17:27
S20	836	ethicon and trocar	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 17:27
S21	367	S20 and seal	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 17:28
S22	229	S21 and (over\$lap layer\$3)	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 18:00
S23	254	antoon.in.	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 18:09
S24	1	S23 and trocar	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/29 18:09
S25	1	"5827228".pn.	USPAT	OR	OFF	2006/03/30 14:33
S26	119632	(overlap\$4 layer\$3) with (seal gasket ring)	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/30 15:38
S27	113950	S26 and (member segment portion section piece)	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/30 15:40
S28	405	S27 and trocar	US-PGPUB; USPAT; USOCR	OR	ON	2006/03/30 15:41
S29	1	"5242412".pn.	USPAT	OR	OFF	2006/04/04 09:35
S30	1750	606/185	US-PGPUB; USPAT; USOCR	OR	OFF	2006/04/04 09:37

## EAST Search History

S31	632	S30 and seal	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/04 14:43
S32	192	604/167.03	US-PGPUB; USPAT; USOCR	OR	ON	2006/09/18 10:36
S33	1	"5147336".pn.	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/04 13:14
S34	190	"167.04"	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/04 13:14
S36	134	604/167.04	US-PGPUB; USPAT; USOCR	OR	OFF	2006/04/04 13:27
S37	167	604/167.06	US-PGPUB; USPAT; USOCR	OR	OFF	2006/04/04 13:27
S38	1750	606/185	US-PGPUB; USPAT; USOCR	OR	OFF	2006/04/04 14:44
S39	632	S38 and seal	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/04 14:44
S40	378	S39 and (trocar endoscop\$3)	USPAT	OR	OFF	2006/04/04 14:45
S41	1	"5800451".pn.	USPAT	OR	OFF	2006/04/05 09:25
S42	1	"6086570".pn.	USPAT	OR	OFF	2006/04/05 09:46
S43	17	("2023267"   "3872525"   "4673393"   "5000745"   "5009391"   "5030205"   "5041095"   "5053013"   "5057084"   "5092846"   "5104389"   "5389081"   "5409463"   "5507732"   "5743884"   "6086570").PN.	US-PGPUB; USPAT; USOCR	OR	OFF	2006/04/05 09:47
S44	1	"5342315".pn.	USPAT	OR	OFF	2006/04/05 10:27
S45	1	"4655752".pn.	USPAT	OR	OFF	2006/04/05 10:41

## EAST Search History

S46	43	(US-20040230161-\$ or US-20020013552-\$ or US-20020156432-\$ or US-20030187397-\$ or US-20030004529-\$ or US-20020019609-\$ or US-20030050604-\$).did. or (US-6017356-\$ or US-5308336-\$ or US-5591190-\$ or US-5385553-\$ or US-5387197-\$ or US-5607440-\$ or US-5364372-\$ or US-5571134-\$ or US-5431635-\$ or US-5314417-\$ or US-5350393-\$ or US-5323765-\$ or US-5989232-\$ or US-5913847-\$ or US-5865807-\$ or US-5720730-\$ or US-7011314-\$ or US-6981966-\$ or US-6702787-\$ or US-6569120-\$ or US-5628732-\$ or US-5217441-\$ or US-5827228-\$ or US-5342315-\$ or US-5657963-\$ or US-5603702-\$). did. or (US-5492304-\$ or US-5242412-\$ or US-6228061-\$ or US-5980493-\$ or US-5800451-\$ or US-6863661-\$ or US-5354280-\$ or US-6610031-\$ or US-5147336-\$ or US-4655752-\$).did.	US-PGPUB; USPAT	OR	OFF	2006/04/05 10:49
S48	27	S46 and cannula	USPAT	OR	OFF	2006/04/05 10:50
S49	5	S48 and protector	USPAT	OR	ON	2006/04/05 10:50
S50	262020	seal and (prong pin protrusion)	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:44
S51	144634	S50 and ring	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:42
S52	72437	S51 and valve	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:43
S53	1475	S52 and cannula	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:43
S54	493	S53 and trocar	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:43
S55	863480	seal	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:44
S56	6979	ring near (pin prong protrusions)	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:44

## EAST Search History

S57	1815	S55 and S56	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:45
S58	616	S57 and valve	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:45
S59	16	S58 and cannula	US-PGPUB; USPAT; USOCR	OR	ON	2006/04/05 15:45
S60	218	604/167.03	US-PGPUB; USPAT; USOCR	OR	ON	2006/09/18 10:36
S61	26	S60 and @pd>"20060406"	US-PGPUB; USPAT; USOCR	OR	ON	2006/09/18 10:37
S62	152	604/167.04	US-PGPUB; USPAT; USOCR	OR	OFF	2006/09/18 10:37
S63	18	S62 and @pd>"20060406"	US-PGPUB; USPAT; USOCR	OR	ON	2006/09/18 10:38
S64	177	604/167.06	US-PGPUB; USPAT; USOCR	OR	OFF	2006/09/18 10:37
S65	10	S64 and @pd>"20060406"	US-PGPUB; USPAT; USOCR	OR	ON	2006/09/18 10:38
S66	1821	606/185	US-PGPUB; USPAT; USOCR	OR	OFF	2006/09/18 10:38
S67	70	S66 and @pd>"20060406"	US-PGPUB; USPAT; USOCR	OR	ON	2006/09/18 10:38
S68	75	606/185 and @pd>"20060918"	US-PGPUB; USPAT; USOCR	OR	OFF	2007/02/28 21:08
S69	12	604/167.03 and @pd>"20060918"	US-PGPUB; USPAT; USOCR	OR	OFF	2007/02/28 21:10
S70	15	604/167.06 and @pd>"20060918"	US-PGPUB; USPAT; USOCR	OR	OFF	2007/02/28 21:13
S71	14	604/167.04 and @pd>"20060918"	US-PGPUB; USPAT; USOCR	OR	OFF	2007/02/28 21:10

## EAST Search History

S72	2473	(semi\$circular semicircle) with seal	US-PGPUB; USPAT; USOCR	OR	ON	2007/02/28 21:16
S73	2504	(semi\$circular semi\$circle) with seal	US-PGPUB; USPAT; USOCR	OR	ON	2007/02/28 21:30
S74	1	"20060135977"	US-PGPUB; USPAT; USOCR	OR	ON	2007/02/28 21:16
S75	50	("20020007153" "20020010425" "20040049173" "20040064100" "20040147949" "3504699" "3773233" "4436519" "4601710" "4610665" "4654030" "4902280" "4931042" "4932633" "5030206" "5053013" "5104383" "5203773" "5209737" "5211634" "5246425" "5300033" "5308336" "5324270" "5364372" "5366445" "5385552" "5385553" "5441041" "5456284" "5467762" "5534009" "5542931" "5569160" "5578016" "5584850" "5603702" "5643301" "5807338" "5895377" "6024729" "6086603" "6277100" "6302852" "6352520" "6569120" "6613063" "6685630" "6702787"). PN.	US-PGPUB; USPAT; USOCR	OR	ON	2007/02/28 21:31

## EAST Search History

S76	78	( "0729423"   "2699826"   "2797837"   "3086797"   "3197173"   "3438607"   "3766916"   "3811440"   "3856010"   "3875938"   "3920215"   "3970089"   "3977400"   "3994287"   "4000739"   "4149535"   "4177814"   "4231400"   "4240411"   "4243034"   "4324239"   "4378013"   "4424833"   "4430081"   "4436519"   "4473369"   "4475548"   "4496348"   "4580573"   "4610665"   "4610674"   "4626245"   "4634421"   "4634432"   "4654030"   "4655752"   "4673393"   "4723550"   "4786028"   "4798594"   "4817631"   "4839471"   "4842591"   "4869717"   "4874377"   "4895346"   "4895565"   "4909798"   "4917668"   "4929235"   "4943280"   "4960259"   "4960412"   "4978341"   "5000745"   "5009391"   "5009643"   "5041095"   "5053014"   "5053016"   "5098393"   "5104389"   "5127626"   "5127909"   "5167636"   "5176653"   "5180365"   "5226879").PN. OR ("6569120"). URPN.	US-PGPUB; USPAT; USOCR	OR	OFF	2007/02/28 21:40
S77	424	(semi\$circular semicircle) with seals	US-PGPUB; USPAT; USOCR	OR	OFF	2007/02/28 21:48
S78	116	(semi\$circular semicircle) near3 seals	US-PGPUB; USPAT; USOCR	OR	OFF	2007/02/28 21:48